

**DECLASS REVIEW by NIMA/DOD** 

REPORT NO. 32 CIA/PIR 75104

**DATE** MAR. 1967

GROUP 1 Excluded from automatic downgrading and declassification SECRET

Approved For Release 2003/03/28 : CIA-RDP78T05161A001300010026-7

#### WARNING

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#### **SECRET**

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PIR 75104

25X1

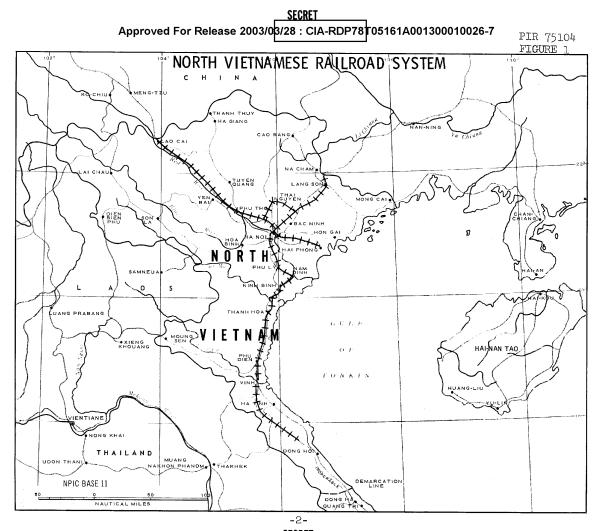
DD! IMAGERY ANALYSIS STAFF

#### PREFACE

This report summarizes significant items of photo intelligence relating to the North Vietnamese railroad system which has been developed from available photography (received by the CIA Imagery Analysis Staff) during the period indicated on the cover. This report is intended to provide a comprehensive view of the railroad system and does not necessarily reflect the most recent status changes as reported by pilots' reports or field photo intelligence cables.

The railroad system has been divided into 5 major lines: the Hanoi/Lao Cai Line, the Hanoi/Dong Dang Line, the Hanoi/Haiphong Line, the Hanoi/Dong Hoi Line and the Thai Nguyen Line (Figure I). Annotated maps and photos are used to show the status of each line.

-1-



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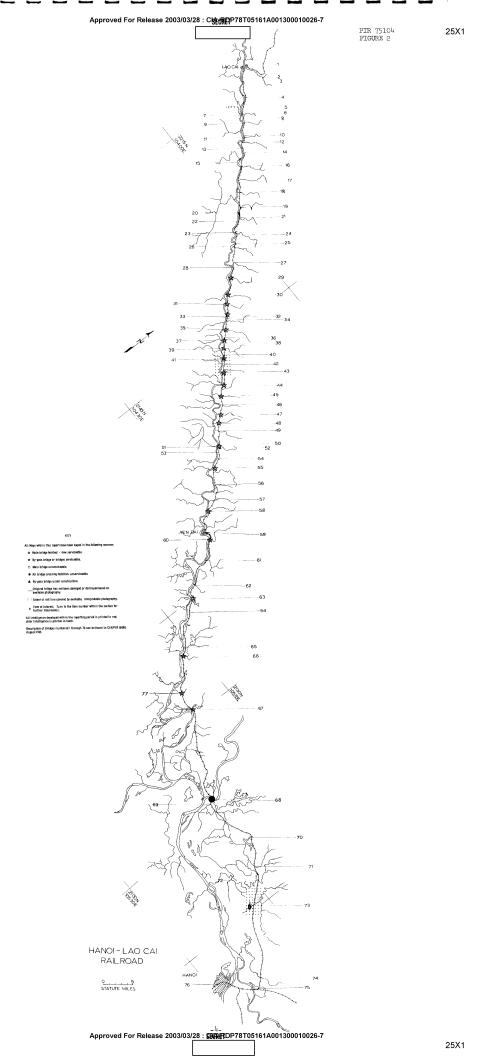
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#### SUMMARY

Those portions of the Hanoi/Lao Cai and Thai Nguyen Rail Lines covered by interpretable photography were open to through traffic. One bridge interdiction was noted on the Hanoi/Dong Hoi Rail Line and considerable reconstruction activity has also been noted on the southern portion of this line.

#### CONTENTS

Hanoi/Lao Cai Rail Line	P <b>a</b> ge	4
Hanoi/Dong Dang Rail Line	-	7
Hanoi/Dong Hoi Rail Line		9
		20
Hanoi/Haiphong Rail Line		21
Thai Nguyen Rail Line		41



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PIR 75104

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## STATUS OF OBSERVED BRIDGES HANOI/LAO CAI RAIL LINE

		Bridge Number and Name	Date last observed	Status	
25X <b>1</b>	30	Lang Thip Railroad Bridge over		S	25X1
25X1	32	Lang Kay Railroad Bridge NW over Ngoi Key		S	
25X1	35	Lang Kay Railroad Bridge over Ngoi Chuc		S	
25X1	37	Lang Kay <u>Railroad Bridge</u> S over Nam Linh		S	
25X1	39	Lang Khay Railroad Bridge over Ngoi Kay		S	
<b>-</b> 25X1	41	Khe Se Railroad Bridge S over stream		S	
25X1	43	Trai Hut Railroad Bridge NW over Ngoi Cho		S	
25X <b>T</b>	24 24	Trai Hut Railroad Bridge over Nam Lam		S	
25X <del>1</del>	45	Som Dong Dep Railroad Bridge over Nam Muoi		S	
25X <b>1</b>	147	Lang Quach Ngoai Railroad Bridge N over Ngoi Vai		S	
25X1	48	Lang Quach Ngoai Railroad Bridge over Ngoi Quach		S	
25X1	51	Pho Chang Railroad Bridge over		S	
25X1	55	Pho Hop Railroad Bridge over Ngoi Hop		S	
- 25X1	67	Phu Tho Railroad Bridge E over stream		S	
~		All data is compiled from photography d Symbols: S - serviceable, U - unservic	eable.	r thereafter.	25X1
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#### Approved For Release 2003/03/28 RDP78T05161A001300010026-7 PIR 75104

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ITEM OF INTEREST NO. 1: Hanoi/Lao Cai Rail Line

NAME : Dia Loi RR. Bridge N.

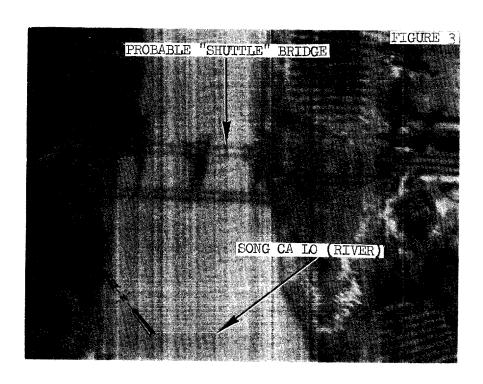
25X1 BE

> COORDINATES : 21 15N - 105 4LE, WJ718508

PHOTO REFERENCE

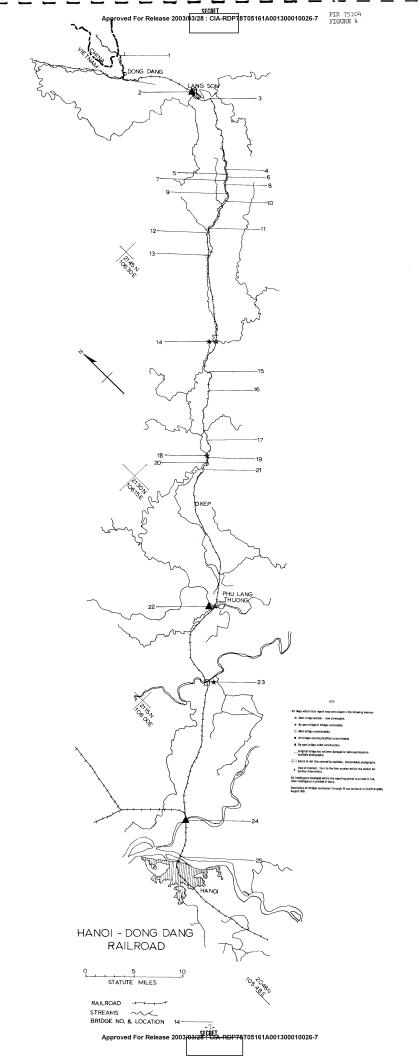
MAP REFERENCE : JOG (A) 1501, NF 48-11

A probable 7-span, deck-beam "shuttle' bridge has been constructed over the Song Ca Lo (River) approximately 400' north of the main bridge The track across this bridge does not connect with the main line, and the bridge itself does not appear to be strong enough to withstand the weight of locomotives and conventional rolling stock. This indicates that the bridge could be used to shuttle goods across the river in lightweight cars, if and when the main bridge is destroyed.

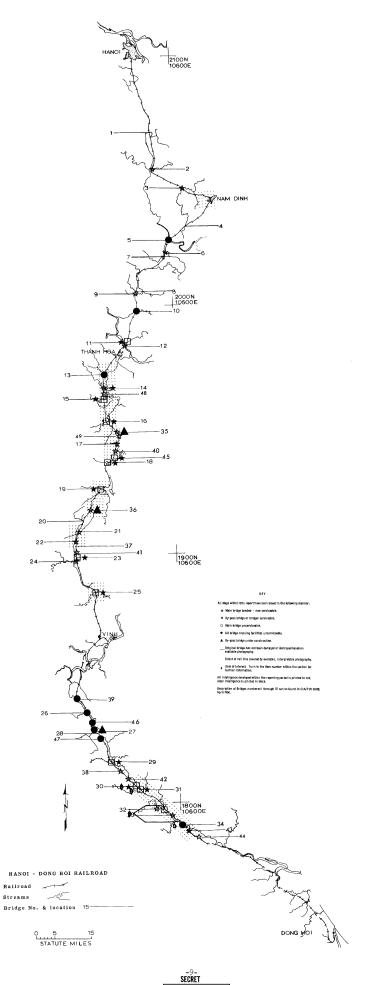


25X1

25X1



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		DDI IMAGERY ANALYSIS STAFF	PIR 75104	
<b>-</b>		STATUS OF OBSERVED BRIDGES HANOI/DONG DANG RAIL LINE		
<b>~</b>				
25X4	14	Cao Nung Railroad Bridge over Song Hoa	S	25X1
25X <u>1</u>	14	Cao Nung Railroad Bridge E over	S	
25X1	22	Bac Giang Railroad and Highway Bridge over Song Thuong	S	
25X1	23	Dap Cau Railroad and Highway Bridge over Song Cau	υ	
25X1	23	Dap Cau Railroad Bridge over	S	
<b>.</b>				
-	* .	All data is compiled from photography dated	or thereafter.	25X1
	;	Symbols: S - serviceable, U - unserviceable		



25X1		Approved For Release 20 <b>6726728</b> : 0	CIA-RDP78T05161A0	01300010026-7	
		DDI IMAGERY ANALYSIS	SSTAFF	PIR 75104	
		STATUS OF OBSERVED HANOI/DONG HOI RA			
		Bridge Number and Name	Date last obser	ved Status	
25X1	3	Cao Duong Railroad and Highway Bridge over canal		β	25X1
25X1	5	Ninh Binh Railroad and Highway Bridge over Song Day		U	
25X1	5	Ninh Binh Railroad Bridge over		U	w
-0/(1	5	Ninh Binh Railroad Pontoon Bridge		U	
25X1	6	Ha Thon Railroad and Highway Bridge over Song Vac		S	٠
25X1	7	Ly Nhan Railroad and Highway Bridge over stream		S	a.
25X1	9	Yen Xa Railroad and Highway Bridge over stream		S	- 1000 7
25X1	10	Dong Phong Thuong Railroad and Highway Bridge over Song Len	y 	U	
25X1	10	Dong Phong Thuong Railroad Bridge S over Song Len	1	U	
25X1	10	Dong Phong Thuong E Railroad By-Pass Bridge		U	•
25X1	11	Phuong Dinh Railroad and Highway Bridgover Lach Truong	ge	U	,
25X1	11	Phuong Dinh Railroad Bridge over Lach Truong		s	<del>-</del>
25X1	12	Thanh Hoa Railroad and Highway Bridge over Song Ma		S .	
25X1	13	Thien Linh Dong Railroad Bridge over		Ŭ	

-10-

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#### Approved For Release 2003/03/28 : CIA-RDP78T05161A001300010026-7

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-		pringe number and mame	Date Last Observed	<u> Dodoub</u>	
25X1	13	Thien Linh Dong Railroad Bridge SW over River		Ŭ	25X1
25X1	14	Thinh Lac Railroad Bridge over stream		S	
25X1	1,14	Thinh Lac Railroad Bridge SSW over stream		S	
25X1	15	Truong Quang Tien Railroad Bridge over Song Yen Tr		Ū	
 25X1	15	Truong Quang Tien Railroad Bridge E		S	
25X1	16	Thi Long Railroad Bridge over Suoi Cay Gang		U	
25X <b>T</b>	16	Thi Long Railroad Bridge SW over Suoi Cay Gang		S	
25X1	17	Phu Quat Railroad Bridge over stream		S	
25X <u>1</u>	18	Dia Thuy Railroad Bridge SW over Khe Dua		Ŭ	
25X1	18	Dia Thuy Railroad Bridge NW over Khe Dua		S	
<del>=</del> 25X1	19	Qui Vinh Railroad Bridge No. 1 over Song Hoang Mai		U	
25X1	19	Qui Vinh Railroad Bridge No. 2 over Song Hoang Mai		S	
25X1	19	Qui Vinh Railroad Bridge No. 3 over Song Hoang Mai		υ	
25X1	19	Qui Vinh Railroad Bridge No. 4 over Song Hoang Mai		S	
25X7	21	Long Ngoc Railroad and Highway Bridge unknown barrier		S	

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		Bridge Number and Name	Date last observed	Status	
25X1	22	Dong Khe Railroad Bridge over stream		S	25X
25X1	23	Dien Chau Railroad Bridge over Song Bang		Ŭ	
25X1	23	Dien Chau Railroad Bridge E over Song Bang		S	PASS
25X1	24	Da Phuc Railroad Bridge over Intermitte Waterway	ent	S	100 mg 1 m
25X1	25	Tam Da Railroad and Highway Bridge over Song Cua Lo		U	
	25	Tam Da Railroad By-Pass Bridge		S	alanto:
25X1	26	Trai Hoi Railroad and Highway Bridge over Ngan Sau		U	
25X1	27	Xom Hoai Railroad and Highway Bridge over Rao No		U	
25X1	32	Xom Khe Railroad Bridge over Khe Net		U	900 90-11
	32	Xom Khe Railroad Bridge By-Pass over Khe Net		S	70
25X1	33	Kim Lu Xa Railroad Bridge over Khe Danh		S	The second secon
25X1	35	Thi Long Railroad Bridge SE over stream		S	100 mg/m
25X1	36	Tho Trang Railroad Bridge over		S	Charles Silver S
25X1	39	Quang Te Railroad Bridge over Khe Hac Giang		Ŭ	and and
25X1	40	Qui My Railroad Bridge over		S	78.5
	41	Tu My Railroad Bridge		S	

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	Bridge Number and Name	Date last observed	Status	
42	Trai Tran Xom Railroad Bridge		S	25X1
43	Dong Ca Thon Railroad and Highway Bridge over Cai Khe		S	
45	Phu Cu Railroad Bridge N over stream		U	
48	Sai Thon Railroad Bridge N over stream		S	
49	Nap Bang Railroad Bridge over stream		S	

*	All data is	compiled from photography	dated .	or thereafter.	25X
	Symbols: S	S - serviceable, U - unserv	iceable		

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PIR 75104

ITEM OF INTEREST NO. 1: Hanoi/Dong Hoi Rail Line

NAME

: Bai Duc Thon RR. Bridge S

25X1 BE

25X1

COORDINATES

: 18 03N - 105 50E, WE886964

PHOTO REFERENCE

MAP REFERENCE

: JOG (A) 1501, NE 48-7

The 10-span Bai Duc Thon Railroad Bridge S has been repaired and is serviceable. This structure has probably been reconstructed as a removeable deck-beam type bridge similar to Bridge No. 29 (Report Nos. 8 and 25). The main bridge remains unserviceable.

> RVICEABLE BY-PASS BRIDGE DESTROYED MAIN BRIDGE

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25X1

25X1

25X1

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PIR 75104

ITEM OF INTEREST NO. 2: Hanoi/Dong Hoi Rail Line

NAME

: La Khe Thon RR. By-Pass Bridge

BE

: NA

COORDINATES

: 18 03N - 105 49E, WE870974

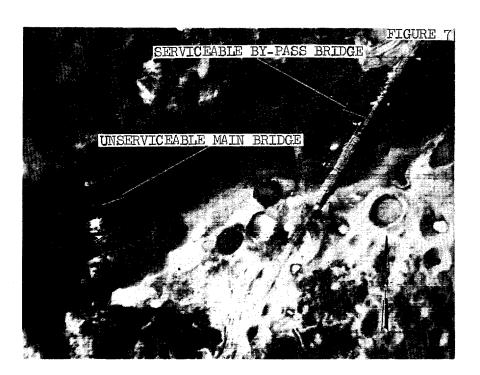
PHOTO REFERENCE

:

MAP REFERENCE

: JOG (A) 1501, NE 48-7

The multi-span, deck-beam La Khe Thon Railroad By-pass Bridge has been repaired and is serviceable. The main bridge remains unserviceable. The track .1 nm south of the by-pass bridge has been interdicted.



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PIR 75104

ITEM OF INTEREST NO. 3: Hanoi/Dong Hoi Rail Line

NAME

: Rolling Stock

BE

: NA

COORDINATES

: Various

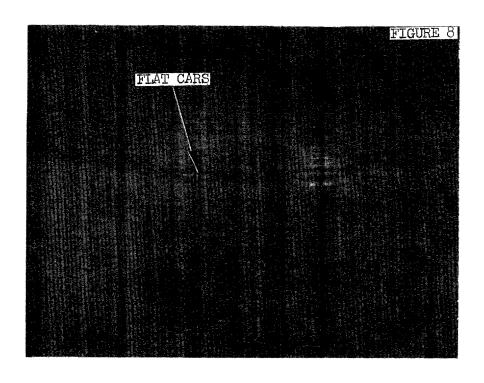
PHOTO REFERENCES

:

MAP REFERENCE

: JOG (A) 1501, NE 48-11

At least six 2-axle flat cars were observed near the Xom Khe river crossing at 17 58N - 105 55E (Figures 8 and 9). One converted truck, 2 possible converted trucks, one 2-axle flat car, and 3 unidentified cars were observed on the rail line just to the north of the destroyed Thuong Phong Trang Railroad Bridge at 17 54N - 106 00E (Figure 10). At least three 2-axle flat cars were located south of this bridge. The presence of this rolling stock, previously not observed at these locations, indicates that this section of the line is in active use.



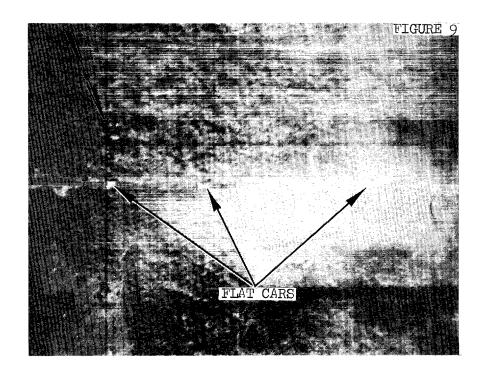
25X1

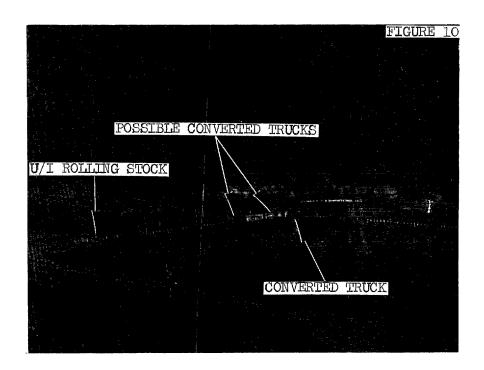
-16-

25X1

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PIR 75104





-17-

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25X1

25X1

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PIR 75104

ITEM OF INTEREST NO. 4: Hanoi/Dong Hoi Rail Line

NAME

: Construction Supplies

BE

: NA

COORDINATES

: 17 54N - 106 OOE

PHOTO REFERENCE

: JOG (A) 1501, NE 48-11

MAP REFERENCE

A considerable amount of construction material is present on both banks of the Rao Nay near the site of the destroyed Thuong Phong Trang Railroad Bridge . Two large stacks of ties are present on the south bank of the river at UTM XEO63803 (Figure 11), and more ties and a stack of rails are located on the north bank at UTM XEO64804 (Figure 12).

These materials may be used in the southward extension of this part of the

rail line.

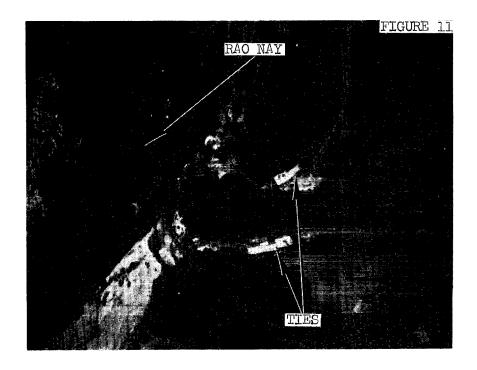
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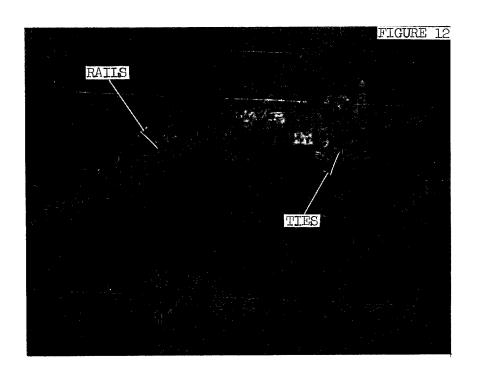
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25X1

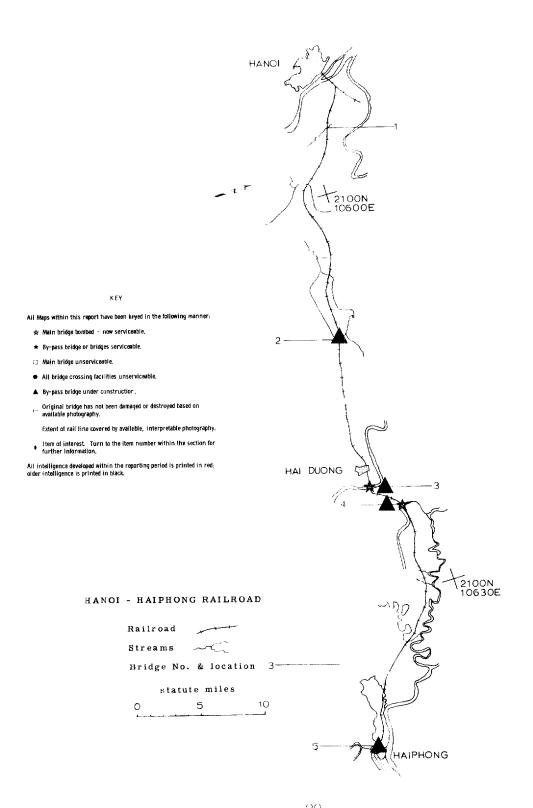
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-19-





# SECRET Approved For Release 2003/03/28 : CIA-RIPP78T05161A00130001002617 75104 FIGURE 14

KEY

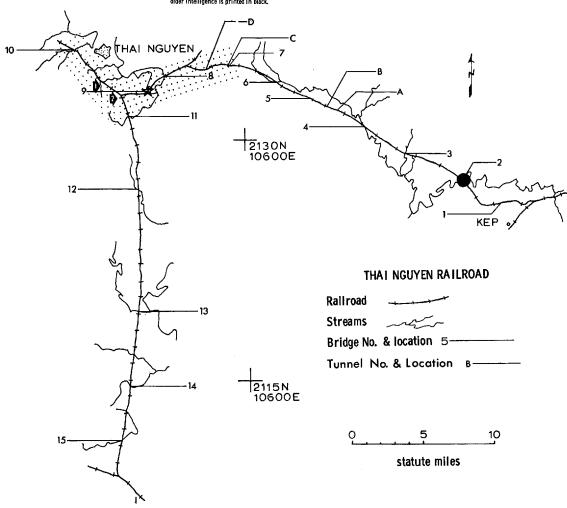
All Maps within this report have been keyed in the following manner:

- ☆ Main bridge bombed now serviceable.
- \* By-pass bridge or bridges serviceable.
- ☐ Main bridge unserviceable.
- All bridge crossing facilities unserviceable.
- ▲ By-pass bridge under construction.
- ,\_\_Original bridge has not been damaged or destroyed based on available photography.

Extent of rall line covered by available, interpretable photography.

 $_{\mbox{\scriptsize b}}$  Item of interest. Turn to the Item number within the section for further information,

All intelligence developed within the reporting period is printed in red; older intelligence is printed in black.



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-		STATUS OF OBSERVET THAI NGUYEN RAII			
		Bridge Number and Name	Date last observed	Status	
25 <b>¼</b> 1	2	Dong Muc Railroad Bridge over Song Thuong		Ŭ	25X
25X1	9	Lang Lau Railroad Bridge over Song Cau		S	
فسن	<del>*</del>	All data is compiled from photography d	lated pr	r thereafter.	25X <sup>-</sup>

Symbols: S - serviceable, U - unserviceable

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PIR 75104

	ITEM OF INTEREST NO.	1: '	Thai Nguyen Rail Line
	NAME	:	Thai Nguyen Railroad Station, Yards and Shops
25X1	BE	: [	
	COORDINATES	: 2	21 33N - 105 52E, WJ882842
	PHOTO REFERENCES	:	
	MAP REFERENCE	: 0	JOG (A) 1501, NF 48-11
25X1	all through tracks ha using tracks leading gauge (i.e., meter an	ve be into d sta	reveals heavy cratering of the Thai gure 15). Both choke points remain intact, but een interdicted. The yard may be by-passed by and out of the steel mill. These tracks are dual andard gauge). Approximately 26 of the 79 pieces ard are damaged or destroyed.
25X1	the turning wye at UTS a string of probable (Figure 16). Large que the yard: one area of turning wye at UTM WJ8 storage is within the at UTS	M WJ8 truck uanti f cor 8748! stor M WJ8	observed north of the yard in the vicinity of 872853. One locomotive was observed attached to a assemblies (i.e., wheel and axle assemblies) ities of rail were stockpiled in 2 locations near accentration is between the yard proper and the 48 (Figure 17), and a second area of probable rail rage area of the Thai Nguyen Iron and Steel Combine 888841 (Figure 18). A portion of these rails may be extension of dual gauge tracking towards Hanoi.
25X1	been repaired, but ser All through tracks are	veral int tota	reveals additional damage to the Thai gure 19). Many of the previous interdictions have a new craters are present from new air strikes. Serdicted, but both choke points remain intact. al of 85 pieces of rolling stock within the yard

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DDI IMAGERY ANALYSIS STAFF

STATUS OF OBSERVED BRIDGES
THAI NGUYEN RAIL LINE

		Bridge Number and Name	Date last observed	Status	
25X1	2	Dong Muc Railroad Bridge over Song Thuong		U	25X
25X <u>1</u>	9	Lang Lau Railroad Bridge over Song Cau		S	
*					

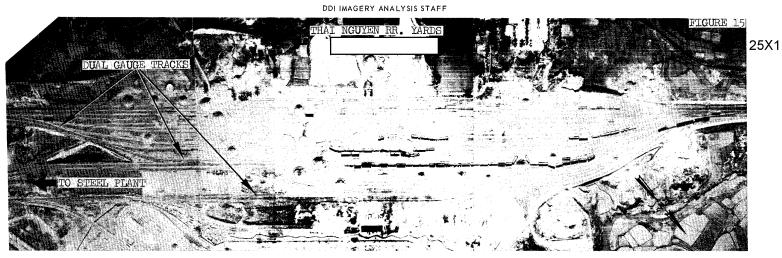
\* All data is compiled from photography dated \_\_\_\_\_\_\_ or thereafter. 25X1 Symbols: S - serviceable, U - unserviceable

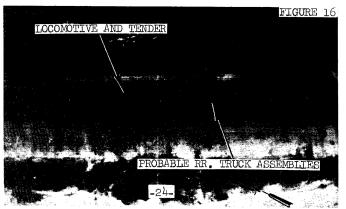
DDI IMAGERY ANALYSIS STAFF

:						
	ITEM OF INTEREST NO.	1: Thai Nguyen Rail Line				
	NAME	: Thei Nguyen Reilroad Station, Yards and Shops				
25X1	BE					
	COORDINATES	: 21 33N - 105 52E, WJ882842				
	PHOTO REFERENCES	:				
	MAP REFERENCE	: JOG (A) 1501, NF 48-11				
25X1	Photography of reveals heavy cratering of the Thai Nguyen Railroad Yards (Figure 15). Both choke points remain intact, but all through tracks have been interdicted. The yard may be by-passed by using tracks leading into and out of the steel mill. These tracks are dual gauge (i.e., meter and standard gauge). Approximately 26 of the 79 pieces of rolling stock in the yard are damaged or destroyed.					
25X1	the turning wye at UT a string of probable (Figure 16). Large que the yard: one area of turning wye at UTM WJ storage is within the	were observed north of the yard in the vicinity of M WJ872853. One locomotive was observed attached to truck assemblies (i.e., wheel and axle assemblies) quantities of rail were stockpiled in 2 locations near of concentration is between the yard proper and the 874848 (Figure 17), and a second area of probable rail storage area of the Thai Nguyen Iron and Steel Combine M WJ888841 (Figure 18). A portion of these rails may n the extension of dual gauge tracking towards Hanoi.				
25X1	been repaired, but set All through tracks are	reveals additional damage to the Thai (Figure 19). Many of the previous interdictions have veral new craters are present from new air strikes. e interdicted, but both choke points remain intact. total of 85 pieces of rolling stock within the yard yed.				

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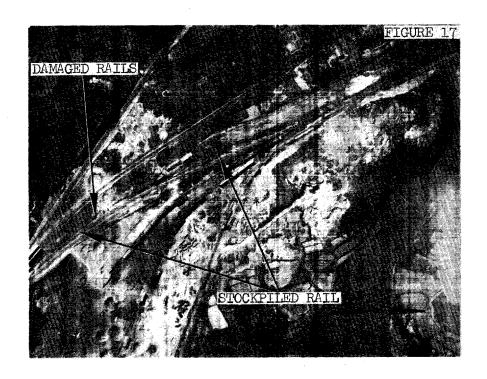


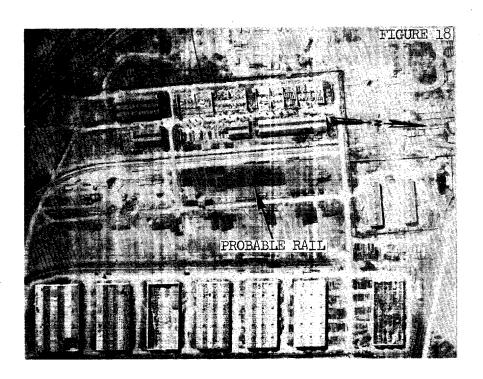


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PIR 75104







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					DDI IMAGERY ANALYSIS STAFF	PIR 75104
ITEM	OF	INTEREST	NO.	2:	Thai Nguyen Rail Line	
MAME				:	Dual Gauge Construction	

BE

21 33N - 105 53E COORDINATES

PHOTO REFERENCE

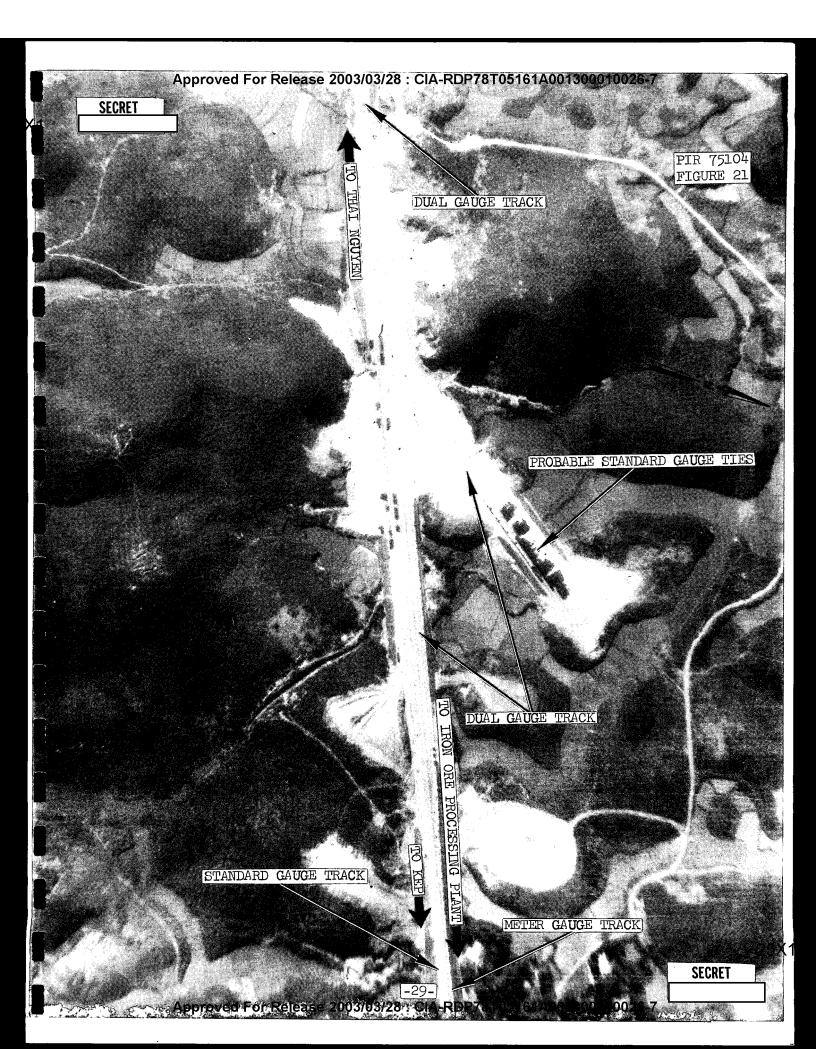
: JOG (A) 1501, NF 48-11 MAP REFERENCE

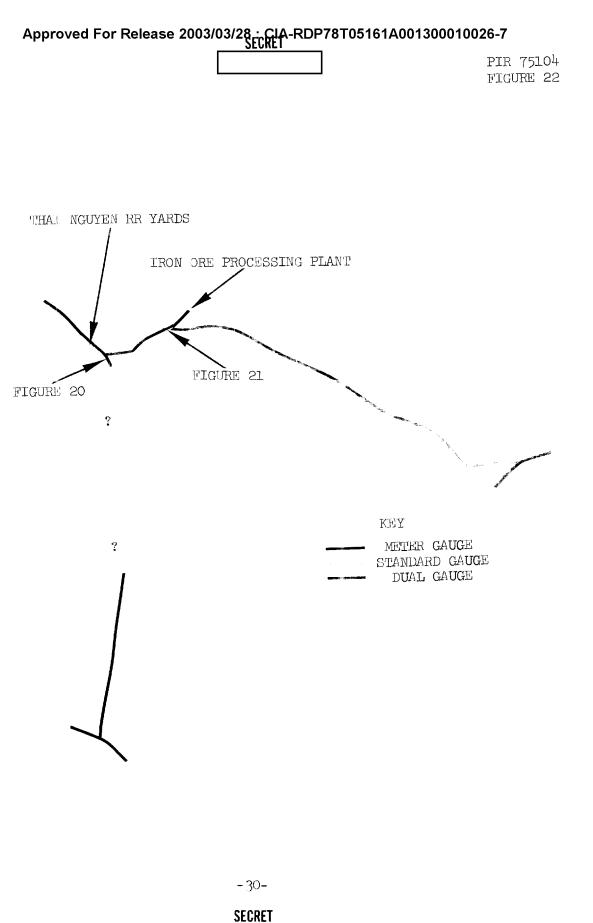
: NA

A further extension of standard gauge tracking has taken place on the Thai Nguyen Rail Line. A short rail segment is in the final stages of construction at UTM WJ898827 (Figure 20). Standard gauge track is being laid on this roadbed, and a probable wielded rail section lying adjacent to the track may be laid to render this segment serviceable to meter gauge traffic also. This new segment will allow traffic to flow directly from Kep to Nguyen Khe without turning around in the Thai Nguyen Railroad Yards The gauges of the Thai Nguyen Rail Line are as illustrated in Figure 22.

-27-







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